

Page 19, line 36, after "primers" insert --(SEQ ID NOS 1 and 5, respectively)--.

Page 20, line 3, after "sequence" insert --(SEQ ID NO:6)--.

Page 24, at the end of the specification, before the claims, insert the printed Sequence Listing submitted concurrently herewith.

## IN THE CLAIMS

Please amend the claims as follows:

1. (Amended) A recombinant [Recombinant] multimeric protein, comprising [characterized in that it comprises at least]:
  - a) a polypeptide fusion [molecule] monomer A, which consists of a cysteine-containing C-terminal fragment of the  $\alpha$  chain of C4BP, [contained between amino acids 124 and 549,] and a polypeptide fragment which is heterologous in relation to said  $\alpha$  chain,
  - b) a polypeptide fusion [molecule] monomer B, which consists of a cysteine-containing C-terminal fragment of the  $\beta$  chain of C4BP, [contained between amino acids 120 and 235,] and a polypeptide fragment which is heterologous in relation to the  $\beta$  chain,  
[with the molecules in a) and b)] monomer A and monomer B being linked to each other by a disulfide bridge between the cysteine of the  $\alpha$  chain C-terminal fragment and the cysteine of the  $\beta$  chain C-terminal fragment [in their C-terminal moiety in order] to form said multimeric protein.
2. (Amended) A recombinant [Recombinant] multimeric protein according to Claim 1, [characterized in that] wherein the C-terminal fragment of the  $\alpha$  chain is contained between amino acids 493 and 549, and [in that] the C-terminal fragment of the  $\beta$  chain is contained between amino acids 176 and 235.
3. (Twice Amended) A recombinant [Recombinant] multimeric protein according to claim 1, wherein [characterized in that] the ratio of the number of monomers  $A/B$  [ $\alpha/\beta$ ] varies between 7/1 and 5/3 [and is preferably 7/1].

*Sub G*

4. (Twice Amended) A recombinant [Recombinant] multimeric protein according to claim 1, [characterized in that] wherein the heterologous fragments in monomer A and in monomer B are derived from specific ligands of the immune system, selected from the group consisting of [in particular derived from] lymphocyte surface proteins of the CD type, [from] antibodies, [or] antibody fragments, [or from] antigens, and [or] antigen fragments.

*Sub G1*

5. (Amended) A recombinant [Recombinant] multimeric protein according to Claim 4, wherein [characterized in that] the fragments derived from lymphocyte proteins are selected from the group consisting of CD4, CD8, CD16, [and] CD35, CR1, and combinations [(or CR1)]. *thereof*

*Sub G2*

6. (Amended) A recombinant [Recombinant] multimeric protein according to Claim 4, wherein [characterized in that] the antibodies or antibody fragments have an anti-Rh(D) specificity. *are specific for*

7. (Amended) A recombinant [Recombinant] multimeric protein according to Claim 4, wherein [characterized in that] the antigens are vaccinating antigens.

8. (Twice Amended) A recombinant [Recombinant] multimeric protein of claim 1, wherein [characterized in that] the heterologous fragment in monomer A is a therapeutic enzyme.

*Sub G3*

9. (Twice Amended) A recombinant [Recombinant] multimeric protein according to claim 1, wherein [characterized in that] the polypeptide fusion monomer A comprises [fragments contain:

- in A,] CD4 or a derivative of CD4, and[;
- in B,] monomer B comprises the scFv of an antibody[, in particular a neutralizing antibody or an anti-Rh(D) antibody].

10. (Twice Amended) A recombinant [Recombinant] multimeric protein according to claim 1, wherein [characterized in that] the polypeptide fusion monomer A comprises [fragments contain:

- in A,] a ligand selected from the group consisting of an antigen, [in particular a vaccinating antigen, or] a therapeutic enzyme. [or] a CD35, CR1, [(or CR1) or] an antibody, [or] and any fragment thereof which possesses the ligand property of the whole ligand molecule, and monomer B comprises
- in B,] an antibody or a fragment thereof which has retained its epitope.

~~11. (Twice Amended) A recombinant [Recombinant] multimeric protein according to claim 1, wherein [characterized in that] the polypeptide fusion monomer A comprises fragments ~~contain~~ <sup>contains</sup> in A a vaccinating immunogen, and monomer B comprises in B a CD4 or a derived molecule[, provided] that [it] retains the ligand property of the whole molecule.~~

~~12. (Amended) A host cell into which has been introduced [Prokaryotic or eukaryotic cells, characterized in that they have been transduced with one or more plasmids containing] a heterologous nucleic acid sequence which encodes at least one polypeptide fusion molecule A which consists of a cysteine-containing C-terminal fragment of the  $\alpha$  chain of C4BP, and a polypeptide fragment which is heterologous in relation to said  $\alpha$  chain, and a heterologous nucleic acid sequence which encodes at least one polypeptide fusion molecule B which consists of a cysteine-containing C-terminal fragment of the  $\beta$  chain of C4BP, and a polypeptide fragment which is heterologous in relation to the  $\beta$  chain.~~

~~13. (Amended) A host cell [Cells] according to Claim 12, wherein the heterologous nucleic acid sequences have been introduced by [characterized in that the cells have been] either[,]:~~

- [cotransduced with] introducing two separate plasmids comprising the two heterologous nucleic acid sequences, or
- [transduced] transducing with a first plasmid encoding one of molecule A and molecule B [a first peptide] and then [supertransduced] ~~transducing~~ <sup>transduced again</sup> supertransducing with a [the] second plasmid encoding the other of molecule A and B [the second polypeptide], or

- [result from the fusion of] fusing two cells, one of which has been transduced with a plasmid encoding one of molecule A and molecule B [the first peptide] while the other has been transduced with a plasmid encoding the other of molecule A and B [the second polypeptide].

14. (Twice Amended) A host cell [Cells] according to claim 12, wherein the heterologous nucleic acid sequences are contained in first and second plasmids, of which [characterized in that] the first plasmid is that which was deposited in the C.N.C.M. under No. I-1610 on 12 July 1995, and the second plasmid is that which was deposited in the C.N.C.M. under No. I-1611 on 12 July 1995.

15. (Twice Amended) A method [Process] for preparing a multimeric protein as defined in claim 1, the method comprising [characterized in that it comprises at least] the following steps:

- transducing at least two target cell lines with at least one plasmid each, each of which plasmids contains a heterologous sequence which respectively encodes a molecule A or a molecule B [an A chain or a B chain] according to claim 1,
- expressing and isolating the heterologous molecule A and molecule B from the at least two target cell lines [A and B chains]
- placing said molecules [polypeptides], in specific proportions, in an oxidizing medium to form multimers, and[,]
- isolating the multimers.

16. (Amended) The method [Process] according to Claim 15, wherein [characterized in that] the transduced lines have been either:

- cotransduced with two plasmids carrying DNA sequences which respectively encode the A and B molecules [polypeptides], or
- ~~transduced with a first plasmid encoding one of molecule A and molecule B and then supertransduced with a second plasmid encoding the other of molecule A and molecule B~~  
transduced again  
~~supertransduced with two plasmids, which two plasmids carry DNA sequences which respectively encode the A and B polypeptides~~, or

- [result from the fusion of] fused from two cells which have, respectively, been transduced with a plasmid carrying a DNA sequence which encodes molecule A [the A polypeptide] and with a plasmid carrying a DNA sequence which encodes molecule B [the B polypeptide].

17. (Twice Amended) [Use of a recombinant multimeric protein according to claim 1 for pharmaceutical preparation producing a] A medicament [which is intended for preventing foetomaternal alloimmunization] comprising a recombinant multimeric protein according to claim 1.

18. (Twice Amended) [Use of a recombinant multimeric protein according to claim 1 for producing a] A pharmaceutical preparation [which is intended] according to claim 17, effective for the therapy or prophylaxis of foetomaternal alloimmunization, viral, bacterial or parasitic infections, disseminated lupus erythematosus, or other alloimmune or autoimmune diseases.

Cancel claim 19.

20. (Twice Amended) [Use of a recombinant multimeric protein according to claim 1 in a] A diagnostic test kit comprising a recombinant multimeric protein according to claim 1 and able to detect the presence [which requires the intervention] of at least two different ligands with affinity for the heterologous polypeptide fragment of molecule A and the heterologous polypeptide fragment of molecule B, respectively.

Cancel claim 21.

Please add the following new claims.

22. A recombinant multimeric protein according to claim 1, wherein the C-terminal fragment of the  $\alpha$  chain includes amino acids 510 to 549, and the C-terminal fragment of the  $\beta$  chain includes amino acids 199 to 235.